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Lorna Hepburn Griffith University, lorna.hepburn@griffithuni.edu.au

Wendi Beamish Griffith University, w.beamish@griffith.edu.au

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Towards Implementation of Evidence-Based Practices for Classroom Management in Australia: A Review of Research

Lorna Hepburn Wendi Beamish Griffith University

Abstract: The components of effective classroom management are well established; yet concerns regarding student disengagement and the underuse of evidence-based behaviour support practices in Australian schools remain. This paper reports the findings from a systematic literature review conducted to identify what is currently known about teacher implementation of evidence-based classroom management practices. The analysis indicates that teachers underuse many evidence-based practices but may over-report frequency of use. Australian research on teacher implementation of evidence-based practices for classroom management is lacking, and the impact of Schoolwide Positive Behaviour Support (SWPBS) implementation on teacher practice is unknown, despite the adoption of SWPBS in many Australian jurisdictions.

Introduction

Classroom management is widely acknowledged to be fundamental to effective teaching as it involves the actions taken by teachers to maintain safe and productive learning environments to maximise instructional time (Cooper et al., 2018; Evertson & Weinstein, 2006). On the surface, the components of effective classroom management appear to be well documented and understood, with a plethora of journal articles and text books dedicated to this topic, and a number of key practices deemed to be evidence-based by both researchers and the teaching profession. It may seem that little more needs to be said about classroom management in schools. Yet, both locally and internationally, policy makers, education systems, and the wider community are increasingly concerned by the disengagement from learning by students, the underuse of research-informed classroom management practices by teachers, and the level of problem behaviour in schools (Armstrong, 2018; Ball, Maguire, & Braun, 2012; Scott, 2017).

In Australia, student disengagement has been recognised as a major problem impacting negatively on student learning outcomes (Australian Institute for Teaching and School Leadership, 2013). Recent attention also has been paid to a number of negative practices used in Australian schools to deal with problem behaviour (Deloitte Access Economics, 2017; NSW Ombudsman, 2017; Victorian Ombudsman, 2017). There is clearly a need, now more than ever, for the consistent teacher use of proactive classroom management practices that enable behavioural disruptions to be minimised and student engagement to be maximised. Put simply, classroom management and student learning are inextricably linked; students cannot learn or reach their potential in environments which have negative and chaotic classroom climates, lack structure and support, or offer few opportunities for active participation.

For decades, the United States of America (USA) has led the way with research into classroom management practices and implementation. Overall, contemporary research into

classroom management has consistently found that a preventative approach, which focuses on proactively teaching and reinforcing expected behaviours, is more effective than a reactive approach, which focuses on dealing with problem behaviour after it occurs (Oliver, Wehby, & Reschly, 2011). Behaviour management is a term historically used in the literature to describe this reactive approach to behaviour and is still considered to fit under the broad umbrella of classroom management. Behaviour management will only be used in this review when the terminology was used in the original source. By comparison, classroom management is viewed as comprising a continuum of practices, ranging from proactive to reactive.

For the purpose of this review, evidence-based practices (EBPs) for classroom management are considered to be the predominantly preventative positive behaviour support strategies identified in numerous research studies as contributing towards a positive and productive classroom environment. These practices have been evaluated using sound research methodology; have been shown to be effective; and are supported by at least three empirical studies published in peer-refereed journals (Simonsen, Fairbanks, Briesch, Myers, & Sugai, 2008).

The consistent use of proactive evidence-based classroom management practices is promoted within Schoolwide Positive Behaviour Support (SWPBS), a whole-of-school approach to preventing problem behaviour with a focus on the development of a positive school climate and schoolwide systems of student support. A strong body of research (e.g., Bradshaw, Mitchell, & Leaf, 2010; Chitiyo, May, & Chitiyo, 2012; Horner, Sugai, & Anderson, 2010; Luiselli, Putnam, Handler, & Feinberg, 2005), exists around the implementation and sustainability of SWPBS. Many schools in Australia have adopted this approach to behaviour support, with education departments in Queensland, New South Wales and Victoria endorsing the framework (NSW Department of Education, 2017b; Queensland Department of Education, 2018; Victoria Department of Education and Training, 2018).

Concerns in Relation to Classroom Management in Australia

In recent years a number of educational reports have highlighted issues in relation to classroom management and student behaviour in Australian schools. Concerns in relation to teacher preparation and ongoing professional development in classroom management have been raised (Goss, Sonnemann & Griffiths, 2017), alongside worries about high rates of disengagement among school students and use of reactive disciplinary practices which adversely impact the students involved, especially those already experiencing disadvantage or barriers to learning, such as disability or experience of trauma.

A Western Australian report on behaviour management in schools (Office of the Western Australian Auditor General, 2014) found that schools were dealing with a range of problem behaviours and that professional development in classroom management, while available, was poorly targeted. It also found that behaviour management support for schools was lacking, with many schools not having access to expertise or opportunities for building teacher capacity in behaviour support. A recent Queensland school improvement report (Queensland Department of Education, 2017) has also highlighted a need for increased training in classroom management in some schools.

Student disengagement and the associated negative outcomes for students have also received recent attention. A Grattan Institute report (Goss et al., 2017) called for better teacher preparation in classroom management and for evidence-based practices to be included in teacher education courses. This report also recommended better ongoing classroom management support for classroom teachers, including opportunities for

observation and feedback and access to quality professional development. The concerns raised about student disengagement in this report were supported by the recent release of student survey data in NSW, which indicated that students were at least 6 months ahead of their peers academically when they were positively engaged, including being well behaved in class and being in classrooms with teachers who made effective use of learning time (NSW Department of Education, 2017a).

In the last two years, complaints from parents and student advocates about the disciplinary practices used in Australian government schools, and concerns about rising rates of suspensions and exclusions, have led to Ombudsman reports in Victoria and NSW and the commissioning of an independent review in Queensland. All statewide reports found an overreliance on exclusionary discipline such as suspensions and expulsions, and the limited use of positive behaviour support practices. The Queensland review (Deloitte Access Economics, 2017) focused specifically on students with disability and recommended more effective implementation of SWPBS as a whole school framework for positive behaviour support, together with increased training and capacity building in behaviour management for teachers and school leaders.

The need for more support for behaviour management was also highlighted in the Victorian report (Victorian Ombudsman, 2017), which noted that many schools seemed illequipped to provide support to students with high needs. Additionally, this report drew attention to the negative life experiences and trajectories often experienced by those students receiving exclusionary disciplinary sanctions. By comparison, the NSW report supported the adoption of the SWPBS framework in schools to promote adoption of positive behaviour support practices, but found a discrepancy between the reported implementation of SWPBS and the actual practices used in schools. For this reason, increased scrutiny of SWPBS implementation in schools was recommended in order to improve implementation fidelity (NSW Ombudsman, 2017). In common with the reports from other state jurisdictions, this one also noted limited expertise in schools in an evidence-based approach to behaviour management and recommended improved professional development for staff in schools, together with coaching and mentoring.

This paper aims to review the recent research from the USA and Australia on classroom management, including the latest research on problem behaviour and SWPBS at the classroom level. It also aims to summarise emerging research on the implementation of EBPs for classroom management. Synthesising this research will help to identify the challenges facing Australian schools in implementing a preventative, research-informed approach to classroom management. Further, it is hoped that this review will foster the development of improved systems of support for teachers, including better training in classroom management and effective implementation of SWPBS to promote an increased focus on a preventive and proactive approach to intervention.

Review Methodology

To examine the recent research into classroom management, a systematic review of the literature was conducted using the ProQuest, SAGE and Informit A+ Education databases. The first two databases were selected due to their strong focus on educational research, while the inclusion of Informit A+ sought to obtain any existing Australian literature. All searches specified peer reviewed journal articles between 2011 and 2018 and used wild card characters to capture alternative spellings and word forms. Combinations of the search terms listed in Table 1 were used, with the process generating 3,156 articles. A preliminary scan of titles quickly reduced the number to 508.

Search Terms

Classroom management/behaviour management

Evidence-based/effective AND teaching/practice/classroom management/behaviour management

Classroom management/behaviour management/classroom practice/classroom organisation AND implement

Schoolwide Positive Behaviour Support/SWPBS/PBIS/Positive Behaviour for Learning AND classroom management/teacher practice

Table 1: Search terms used for systematic literature review

Once duplicates were eliminated, 249 articles remained for further investigation. Abstracts for these remaining articles were then read in order to select articles for reading in full. Articles with abstracts containing references to general classroom management or classroom management practices, as well as abstracts referencing components of SWPBS implementation in classrooms were retained. This process resulted in 84 articles being retained for a full reading. The criteria listed in Figure 1 were then applied to finalise the selection process. An overview of the systematic search process is shown in Figure 1, showing that a total of 27 articles remained following application of the inclusion and exclusion criteria.

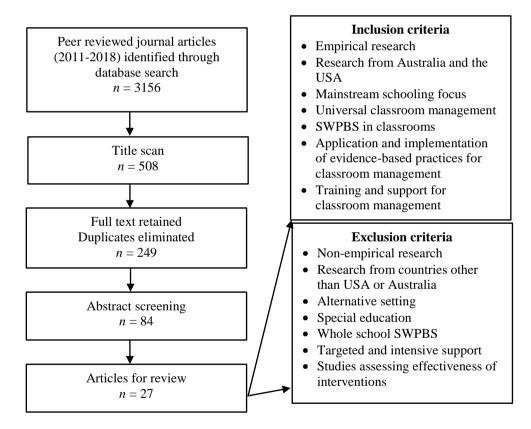


Figure 1: Overview of the systematic literature review process for peer reviewed journal articles, 2011-2018

Following the selection of articles, a table (see Table 2) was constructed to capture key information, including research design, context and main topic. Articles were then analysed to identify key descriptive themes. A thematic analysis was conducted, following the 6-phase process recommended by Braun and Clarke (2016). Themes identified through this analysis were: (a) beliefs about behaviour, (b) teacher practice, (c) SWPBS and classroom management, and (d) implementation barriers and supports.

Study	Country	Design	Context	Topic
Borgmeier et al.	USA	Survey	All sectors, 9	Teacher implementation of EBPs ^a
(2016)		•	school districts	•
Briere et al. (2015)	USA	Multiple baseline	Primary school	Specific praise training
Cook et al. (2017)	USA	Experimental	Primary school	Increasing use of EBPs
Cooper et al. (2018)	USA	Survey	4 states, various sectors	Impact of classroom management training
Fallon et al. (2014)	USA	Survey	Teachers in SWPBS schools	Impact of SWPBS ^b on classroom practices
Farmer et al. (2013)	USA	Experimental	28 middle schools	Classroom management PD ^c
Feuerborn & Chinn (2012)	USA	Interviews	Preservice/current teachers	Teacher perceptions of behaviour support
Feuerborn & Tyre (2016)	USA	Survey	Primary, middle and secondary	SWPBS implementation and teacher beliefs
Ficarra & Quinn (2014)	USA	Survey	Teachers, 1 state (all sectors)	Teacher use of EBPs
Hagermoser Sanetti et al. (2018)	USA	Multiple baseline	Primary school	Teacher consultation and coaching
Kamps et al. (2011)	USA	Randomised trial	17 primary schools, 3 districts	Classroom management PD
McGoey et al. (2014)	USA	Survey	Primary teachers	Barriers to implementation of EBPs
Moore at al. (2017)	USA	Survey	Primary teachers, 2 districts	Teacher use of EBPs
Motoca at al. (2014)	USA	Cluster randomised	14 middle schools	Classroom management PD
O'Neill & Stephenson (2014)	Australia	Review	Preservice teaching courses	EBPs content in preservice courses
O' Neill & Stephenson (2012)	Australia	Survey	Preservice teachers	Perceptions of confidence
Poduska & Kurki (2014)	USA	Mixed- methods	Primary teachers	PD and coaching
Reglin et al. (2012)	USA	Experimental	Primary teachers	Classroom management PD
Reinke at al. (2014)	USA	Experimental	Primary teachers	Coaching following PD
Reinke et al. (2013)	USA	Quasi- experimental	Primary teachers, 3 SWPBS schools	Teacher efficacy and classroom management
Roache & Lewis (2011)	Australia	Survey	Primary and secondary	Teacher responses to misbehaviour
Scott et al. (2011)	USA	Quasi- experimental	2 primary and 2 high schools	Teacher use of classroom management practices
Shook (2012)	USA	Interviews	Preservice teachers (primary)	Reasons for selection of behaviour support strategies
Simonsen et al. (2017)	USA	Experimental	Primary teachers from 2 schools	PD delivery on classroom management
Stormont et al. (2015)	USA	Review	Mainly USA, all school sectors	Effectiveness of coaching
Sullivan et al. (2014)	Australia	Survey	Teachers (P-12) in 1 state	Teacher responses to problem behaviour
Yeung et al. (2016)	Australia	Review	USA research	Sustainability of SWPBS implementation

implementation

aEBPs = Evidence-based practices; bSWPBS = Schoolwide Positive Behaviour Support; cPD = Professional development

Table 2: Studies included in this review

Key Themes Identified Beliefs about Behaviour USA

In the USA, two qualitative studies have examined teacher beliefs and knowledge about behaviour support. Shook (2012) interviewed 19 preservice teachers, following an inschool teaching placement, and found they reported mainly using reactive strategies to respond to student behaviour, rather than employing preventative antecedent-based strategies, such as restructuring the environment or providing prompts. Interestingly, most of the preservice teachers reported satisfaction with their classroom management approach and were not inclined to change any strategies, suggesting that they believed that their current approach was appropriate and they had no need to change their practice.

Another study, using grounded theory, analysed 69 written responses from teachers working in primary and secondary schools in various states in the USA (Feuerborn & Chinn, 2012). Scenarios were provided portraying a number of challenges facing fictitious students, and teachers were asked to provide a plan for support provision in order to assess teacher knowledge of positive behaviour support strategies. The analysis showed that teachers tended to attribute social and academic problems to external factors. However, teachers in schools implementing SWPBS were more likely to consider environmental variables and making adjustments to the environment to prevent problems. This finding may suggest that teachers who have received training in positive behaviour support are more aware of the classroom variables that are within the control of the teacher, and have a better understanding of the importance of prevention.

Australia

One recent study from Australia specifically examined teacher views in relation to student behaviour and their use of classroom management practices. In a large survey of primary and secondary teachers in South Australia, Sullivan and colleagues (2014) reported teacher perceptions consistent with the two studies from the USA. Over one thousand primary and secondary teachers responded to an online survey about their classroom management experiences. The majority of the participating teachers reported that the main problem behaviours they dealt with on a daily basis were low-level behaviours such as talking out of turn, or task refusal. Overall, teachers tended to use strategies which sought to control student behaviour, suggesting that they attributed student misbehaviour to external factors and did not perceive that the classroom and instructional environment impacted on student behaviour. The authors argued for a better understanding of problem behaviour and taking the ecology of the classroom into account in order to increase student engagement with learning.

Teacher Practice *USA*

Several studies investigating teacher use of classroom management practices have been undertaken in the USA. Ficarra and Quinn (2014) asked teachers from all school sectors in the state of New York to rate their knowledge and competency in relation to a number of evidence-based classroom management practices. Overall, teachers reported medium-to-high knowledge and competency ratings for the majority of practices. Teachers working in schools implementing SWPBS and teachers trained in special education, however, reported higher ratings compared to teachers working in non-SWPBS schools or general education,

respectively. This finding possibly reflects the benefits that accrue when ongoing professional development in evidence-based classroom management practices is provided to schools implementing SWPBS, and when more behaviour-based content is provided in special education courses.

Another survey of over 600 teachers (Borgmeier, Loman, & Hara, 2016) looked at self-reported implementation of evidence-based classroom management practices across school sectors in nine districts in the northwest USA, noting the differences across responses from primary, middle and high school teachers. Overall, a downward trend in implementation according to year level grouping was noted, with primary teachers reporting higher use of the provided practices. High school teachers reported lower use of certain practices, specifically in relation to the teaching of expectations and encouraging student engagement with academics. There were also some similarities in the extent of use of a few practices across all school sectors, with most teachers reporting high rates of use of active supervision, giving clear instructions, and provision of engaging instruction.

Two more recent surveys have investigated teacher use of EBPs for classroom management, with results indicating that teachers generally report high rates of use of these practices. Moore and colleagues (2017) surveyed 160 primary teachers in one south-eastern state in the USA about their knowledge and implementation of 10 sets of research-based classroom management practices. Overall, teachers reported good knowledge and frequent use of the provided practices, with higher knowledge and use of the preventative practices such as teaching routines and monitoring students. Lower levels of knowledge and use were reported for strategies used in response to problem behaviour, such as teaching replacement behaviours for problem behaviours and designing and implementing behavioural interventions, although the majority of responding teachers still rated themselves as *very* or *somewhat* knowledgeable and as using the practices *very* or *somewhat* frequently.

The second survey was conducted across four states and involved over 200 teachers from various school sectors, with the aim of investigating teacher training, use, and perceived effectiveness of 37 EBPs for classroom management (Cooper et al., 2018). Overall, it was found that receiving formal training on specific classroom management practices increased reported use, but did not affect perceptions of effectiveness. However, only a third of respondents had received training in the majority of the practices. High rates of use were reported for most of the provided practices, with higher rates of use for preventative and instructional practices, such as teaching routines and providing opportunities to respond. Teachers reported lower frequency of use of most consequence and self-management strategies. For example, 26% of respondents reported not using visual performance feedback to help students monitor their behaviour, and 16% reported not using error correction. This study also found that teacher characteristics such as gender and experience made little difference in the modelling conducted, suggesting that accessing formal training in classroom management practices increases use, regardless of teacher characteristics.

There have also been some recent observational studies on implementation of EBPs for classroom management. Findings from these studies are inconsistent with the previously discussed research, where results were obtained through self-report. Scott, Alter and Hirn (2011) reported on a study where over 1000 classrooms were observed in two primary and two high schools in mid-western USA. Two main findings in relation to use of EBPs were reported. First, a significant proportion of time (37.9%) was coded as *not teaching*, despite observations taking place in designated teaching time, thus indicating that active engagement was lacking. Second, low rates of positive acknowledgement were recorded, with more negative than positive feedback being provided to students.

A similar result was reported in a study which observed 33 primary teachers working in schools implementing SWPBS with high fidelity in one mid-western school district

(Reinke, Herman, & Stormont, 2013). Low rates of specific praise and few opportunities to respond were noted. This study also surveyed teachers using *The Ohio State Teacher Efficacy Scale* (Tschannen-Moran & Hoy 2001) and the *Maslach Burnout Inventory* (Maslach, Jackson, & Leiter 1997)) and found that teachers using less positive praise and with higher rates of observed student problem behaviours reported feeling less efficacious and more emotionally exhausted. Use of harsh reprimands was associated with greater emotional exhaustion and increased disruptive behaviour. These results suggest that teacher self-assessment of classroom management efficacy and emotional exhaustion are related to the classroom management practices they use.

Australia

Few studies, published in the previous seven years, have investigated the classroom management practices used by teachers in Australia. There have been two recent studies which have surveyed teachers regarding the classroom management practices they employ. According to these studies, the use of punitive practices is widespread.

Roache and Lewis (2011) surveyed over 500 primary and secondary teachers in Victoria on their use of six provided classroom management strategies (viz., aggression, discussion, hinting, involvement, recognition and punishment). Aggression and punishment are undoubtedly reactive strategies, while the other practices are typically seen as fitting within the established EBPs for classroom management. For example, discussion and involvement are strategies to actively engage students, and recognition is a way of acknowledging appropriate behaviour. Overall, this study showed that teachers reported using reactive practices most frequently. Primary teachers reported using more recognition and hinting, while secondary teachers reported more use of punishment, such as yelling or imposing aversive consequences. Secondary teachers also reported less use of recognition. When teacher self-reports were compared with student reports, collected as part of a related study, students reported that both primary and secondary teachers used higher rates of aggression and punishment than reported by teachers.

In the South Australian study previously mentioned (Sullivan et al., 2014), teachers were asked to select the classroom management practices they use most frequently to respond to student misbehaviour. Secondary teachers reported higher use of verbal reprimands and primary teachers were more likely to use a "step" system involving an increasing level of consequences for ongoing misbehaviour. Reasoning with the student was the strategy most used overall, with primary teachers reporting using this strategy more than secondary teachers. Sullivan and colleagues concluded that the strategies used by teachers to respond to problem behaviour may not take into account the underlying causes or functions of the behaviour.

SWPBS and Classroom Management *USA*

Research into the implementation of SWPBS at the classroom level is emerging, with only a handful of studies in the USA being undertaken, and no studies being undertaken in Australia. To date, teachers in schools implementing SWPBS in the USA have reported consistent implementation of preventative classroom management practices, despite some challenges associated with consistently responding to problem behaviour, differentiating instruction, and explicitly teaching behavioural expectations (Fallon, McCarthy, & Sanetti, 2014). Research by Feuerborn and colleagues also suggests that teachers in schools

implementing SWPBS are more likely to take a preventative approach and show more commitment to positive behaviour support practices (Feuerborn & Chinn, 2012; Feuerborn & Tyre, 2016). In the study of teachers in New York State previously mentioned (Ficarra & Quinn, 2014), teachers working in SWPBS schools reported higher knowledge of establishing, teaching, and reinforcing expectations, which perhaps reflects the strong emphasis on teaching and reinforcement within the SWPBS framework. By comparison, low rates of praise and opportunities to respond were observed in primary classrooms implementing SWPBS with high fidelity (Reinke et al., 2013).

Australia

In an Australian review of the international literature on the effective implementation and sustainability of SWPBS (Yeung et al., 2016), four essential components for implementation integrity and ongoing improvement of outcomes were derived from the existing literature. These elements are *administrator support*, *professional development*, *classroom implementation fidelity*, and *effective evaluation*. The authors highlighted the importance of classroom fidelity to successful SWPBS implementation, based on evidence that implementation of positive behaviour support practices at the classroom level is a key predictor of effective schoolwide implementation. However, it was noted that classroom implementation may be less than optimal due to the lack of professional development and coaching in EBPs for behaviour support. The authors also proposed that teachers should receive coaching, which not only focuses on underlying beliefs and practices, but also supports teachers in collecting and analysing classroom behaviour data to inform student interventions.

$\begin{array}{c} \textbf{Implementation Barriers} \\ \textbf{\textit{USA}} \end{array}$

In the USA, a number of challenges facing teachers with implementation of EBPs for classroom management have been suggested. McGoey and colleagues (2014) surveyed 67 primary teachers to investigate barriers to the implementation of an evidence-based classroom behavioural intervention. Less than half of participants agreed that the intervention was feasible and all of the provided barriers to implementation were rated as serious impediments to implementation by the majority of teachers. The barriers identified as the most likely to impede implementation were lack of training and time, limited access to resources, and lack of knowledge about behavioural issues. Teachers reporting higher stress levels were more likely to perceive the barriers as more serious.

Australia

Lack of classroom management content and practice in preservice courses is one barrier to effective classroom management in schools identified in studies carried out in Australia. A review of 12 prescribed text books and 19 models of behaviour management included in Australian preservice teacher preparation courses (O'Neill & Stephenson, 2014) concluded that there was a lack of evidence-based behaviour management content. While some limited course content was evidence-based, it was often presented alongside other, non-evidence-based content or models, detracting from the likelihood that beginning teachers would realise the importance of selecting EBPs over other strategies. In a previous study, these researchers also reported that completion of coursework in classroom management

increased familiarity with strategies and perceptions of confidence and preparedness, yet preservice teachers only felt somewhat prepared to manage classroom behaviour (O'Neill & Stephenson, 2012).

Implementation Supports

In comparison to research into implementation barriers, more has been published in recent years on the supports for teacher implementation of EBPs for classroom management. This literature, all of which emanates from the USA, can be divided into studies looking at the effects of professional development on teacher implementation, and studies investigating the impact of professional development and follow-up coaching on teacher practices.

Improved implementation outcomes following professional development in classroom management have been reported in a number of studies. In a randomised control trial, which took place over 4 years, Kamps et al. (2015) found that primary teachers who received training in a group contingency intervention increased their delivery of praise statements and decreased the number of reprimands they used. In another study, Reglin, Akpo-Sanni, and Losike-Sedimo (2012) reported a reduction in problem behaviour and behaviour referrals following professional development in classroom management practices, which taught teachers how to deliver explicit correction and consider the underlying function of behaviour.

Two recent small-scale studies using experimental designs have reported an increase in teacher use of specific EBPs following explicit professional development on the target practices. In the first study (Simonsen et al., 2017), six teachers received scripted training in the use of behaviour specific praise and the development of a self-management plan. Teachers also received a weekly email prompt to use the practice and submit data. As a consequence, all teachers increased their use of behaviour specific praise following the training, although this level of use was not maintained in the follow-up phase in which prompts and support for self-management were withdrawn. In a similar study (Cook et al., 2017), three primary teachers who received direct instruction and practice in use of positive acknowledgement (intervention group) increased their acknowledgement to correction ratio in comparison to levels of acknowledgement used by the control group. Reduction in disruptive behaviour and increases in student engagement were also noted in classrooms of the intervention group. As both studies had small sample sizes, more research is warranted to determine if similar results can be obtained with a broader range of teachers.

Several studies conducted in recent years have reported improvements in teacher implementation of EBPs as a result of coaching being delivered as a follow-up to professional development in classroom management. A review of the literature on coaching (Stormont, Reinke, Newcomer, Marchese, & Lewis, 2015) found that 86% of studies showed that coaching increased teacher use of social behavioural interventions. In addition, two studies involving randomised control trials (Farmer et al., 2013; Motoca et al., 2014) have looked at the effects of a directed consultation model on the implementation of a universal classroom management program to support early adolescent development in middle schools. Teachers receiving training and follow-up consultation support were found to use more positive feedback and structure their classrooms more effectively for increased student engagement, and were also more able to identify students needing support to form prosocial relationships. Implementation of universal classroom management programs in primary settings, involving use of EBPs such as behaviour specific praise and provision of prompts, has also been seen to improve when teachers receive coaching, including opportunities for observation, performance feedback, and goal setting (Poduska & Kurki, 2014; Reinke, Stormont, Herman, & Newcomer, 2014).

Two recent multiple-baseline studies (Briere, Simonsen, Sugai, & Myers, 2015; Hagermoser Sanetti, Williamson, Long, & Kratochwill, 2018) have demonstrated increases in use of EBPs when teachers were provided with opportunities for feedback and action planning following brief training. In the first study (Briere et al., 2015), early-career teacher use of behaviour specific praise was seen to increase, and be maintained in a follow-up phase when scripted training and regular performance feedback from a mentor teacher was provided. Although, this study was very small in scale and involved only three teacher dyads, it holds promise that there is the potential to build coaching capacity within schools and provide support in a way that is deemed acceptable to teachers. In the second study (Hagermoser Sanetti et al., 2018), rates of praise and provision of opportunities for students to respond were seen to increase, while reprimands and disruptive student behaviours decreased when coaching support was provided to another small number of teachers (n = 3) by a consultant.

Taken as a whole, accumulating evidence is pointing to the need for quality preservice and inservice training in classroom management, preferably with follow-up coaching support to ensure effective implementation of practices. A number of recent small-scale studies with teachers have demonstrated that the implementation of specific EBPs, such as behaviour specific praise and the provision of opportunities for students to respond, can be increased when teachers receive brief, explicit training followed by delivery of performance feedback and guided goal setting.

Conclusion and Implications

This review sought to summarise what is currently known about use of classroom management practices in Australia and the USA, and to identify some of the challenges to the consistent implementation of EBPs for classroom management. In doing so, recent research into teacher beliefs about behaviour and current classroom management practices in schools were drawn together. So too was the latest research on use of EBPs for classroom management together with barriers and supports to implementation of EBPs. However, it is important to note the limitations of this review. First, although a systematic review process, using replicable steps and clear criteria, was used, it is possible that some relevant empirical studies may have been missed. Second, the limited number of studies located means that generalisation of findings across countries is not possible. Finally, no measure of study quality was used, as the aim was to provide descriptive information about the current research base. The addition of exclusion criteria based on research quality may have further reduced the already small number of studies, making it difficult to arrive at a meaningful interpretation of the research undertaken.

There is clearly scope for further research into teacher use of classroom management practices within the Australian context. The studies conducted by Roache and Lewis (2011) and Sullivan and colleagues (2014) in Australia suggest that many teachers use reactive practices which attempt to control student behaviour in the mistaken belief that the problem behaviour lies within the child or the home situation. These findings point to the need for professional development which focuses on building teacher capacity to use positive behaviour support practices and effective instruction in order to reduce problem behaviour. Moreover, a need for better teacher understanding of the underlying reasons for student misbehaviour, the importance of prevention, and the development of positive classroom environments also appear paramount. Furthermore, the literature reviewed here affirms calls made from overseas (Bromfield, 2006; Pavri, 2004), and in Australia (Deloitte Access Economics, 2017; Goss et al., 2017; Queensland College of Teachers, 2015; Queensland

Department of Education, 2017) for better initial and ongoing classroom management training.

Nonetheless, there is still much to learn about teacher classroom management practices in Australia. The Australian studies considered in this review focused on what teachers do in response to problem behaviour. A more nuanced picture of teacher practice is likely to appear with attention to the preventative strategies that teachers use in daily practice. To date, little information is available on teacher knowledge and use of EBPs for classroom management in Australia. Hence, there is an urgent need for research in this area.

Research conducted in the USA indicates that teachers use EBPs for classroom management at levels below optimal rates, with observational studies noting that teachers in that country provide low levels of behaviour specific praise and infrequent opportunities for students to respond. In addition, many teachers appear to struggle with consistently using practices known to minimise behavioural problems and maximise time available for instruction (Reinke et al., 2013; Scott, Alter, & Hirn, 2011), despite these practices being well established.

Higher rates of use of EBPs have been reported in some large-scale teacher surveys, although the self-reported data indicates that some EBPs, such as explicitly teaching expectations and differentiating instruction, are lacking. Other self-reported data from the USA indicates that teachers in schools implementing SWPBS are more likely to use a preventative approach and focus more on strategies which teach and reinforce expected behaviours However, research is needed in Australia to see if the implementation of SWPBS has resulted in more productive and positive classrooms and increased teacher use of EBPs for classroom management here. It remains to be seen if teachers in schools adopting the SWPBS framework in this country are more likely to know and use the EBPs for classroom management, which are promoted within the preventative schoolwide approach of SWPBS.

This review has identified a number of potential barriers to the widespread adoption of an evidence-based approach to classroom management. In particular, the review has affirmed the critical need for preservice teacher education programs to be adjusted to include more classroom management content, a focus on EBPs, and more opportunities for preservice teachers to practise classroom management in real-life settings. The literature reviewed here also supports recommendations made in recent educational reports for better ongoing teacher professional development in classroom management and the understanding of problem behaviour. Moreover, the positive results demonstrated in several studies from the USA strengthen the argument for coaching and performance feedback to be incorporated into ongoing professional learning activities.

Finally, it is important to acknowledge the complexity of teaching and the increasing demands being made on classroom teachers. Teacher stress, workload, and lack of systems support all need to be considered in order to find ways to encourage teacher take-up of EBPs for classroom management without a "blame and shame" approach. It is not enough to simply tell teachers to be proactive and use EBPs. Time must be spent ensuring that teachers have opportunities to engage with research in meaningful ways, opportunities to learn from each other, and experience recognition of effective practice in the classroom. A collaborative approach to the ongoing building of teacher capability must be taken, which acknowledges teacher expertise and accepts the premise that the vast majority of teachers want to make a positive difference to the lives of their students.

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